

Wood Products



**BIOECONOMY  
SOLUTIONS**

# **PAULOWNIA TREE PRODUCTS**

Brought to you by  
BioEconomy Solutions

**MEGAFLORA - PAULOWNIA TREES**



# **SUSTAINABLE & RENEWABLE**





# Paulownia V.S. Balsa

Strength modulus of rupture mor (psi)

**Balsa**

**2800**

**Paulownia**

**5740**

**Source:** Dr. R.C. Tang, Auburn University

## STRENGTH

Paulownia Wood... the Less Expensive, Stronger Alternative to Balsa Wood

Balsa has been incorrectly considered to have the highest strength to weight ratios of any wood in the world.

Paulownia has been thoroughly tested and found to have a higher strength to weight ratio than Balsa!

Auburn University tested the strength of 18 lb p/cubic ft. Paulownia against Balsa, with an average weight of 10 lbs p/cubic foot.

**30% Stronger** than pine  
&  
**40% Lighter** than other hardwoods

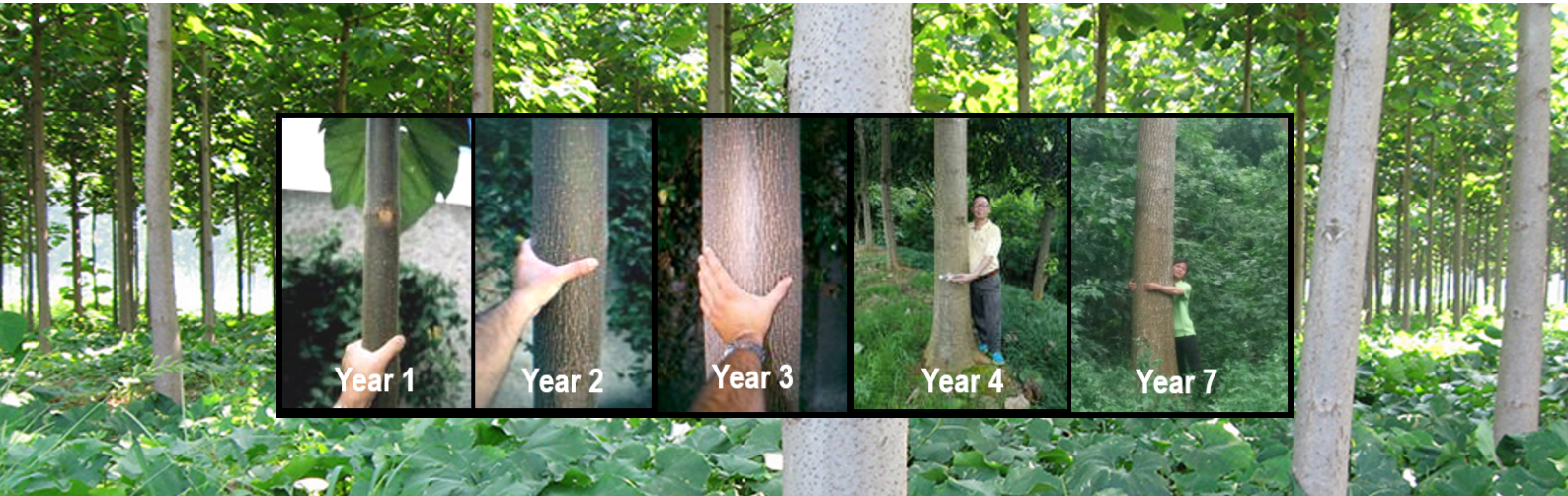


# OUR OBJECTIVE

We are using sustainable finance for timber projects to create new forests and jobs.

Our trees mature in 5 years and create timber products.

The introduction of this high yield short rotation (HDSR) tree to the global commercial timber products market is our primary goal.



# OUR HISTORY

BES is pioneering the MegaFlora tree business in the United States already in China since 2012.

As of March 2020, over 15 million Megaflora trees have been planted by Dr. Allen's Chinese team in 7 different provinces and 17 different locations from the City of Yantai on the coast to the Town of Qeimo west of the Gobi Desert.

**MegaFlora is growing in the United States at multiple locations in California and South Carolina - USA.**





# MEGAFLORA WOOD PRODUCTS USES AND BENEFITS

## MegaFlora Wood Products

- MegaFlora trees produce a blond timber with a long straight grain without knots, which air dries quickly with low shrinkage and does not easily warp, crack or deform.
- MegaFlora wood is used in the production of musical instruments, furniture, windows, doors, venetian blinds, dimensional lumber, plywood, cabinetry, roofing, siding, and crown mouldings.



The wood accepts stains and adhesives easily.





# EXCELLENT SOURCE OF WOOD FOR MANUFACTURING PRODUCTS

Excellent source of biomass for timber products:

- Because of its fast growth rate, MegaFlora trees reach ideal harvest stage for milling a wide range of manufactured wood products in 5 years.
- MegaFlora wood is ideal for milling dimensional lumber, veneer for plywood, furniture, cabinetry, roofing, siding, blinds, doors, door & window frames, wall moulding, and wooden musical instruments.
- Because MegaFlora wood has excellent characteristics for many types of wood products – light-colored and mostly knot-free, strong and even-grained, density between that of balsa and poplar (15 to 19 pounds per cubic ft.), which is about half the density (weight) of pine but equal in strength to pine, insect and fire resistant – it possesses unlimited applications.
- Because of its naturally low moisture content (~25%), the period time requires for drying MegaFlora wood prior to milling for some purposes such as cabinetry or flooring is significantly decreased.



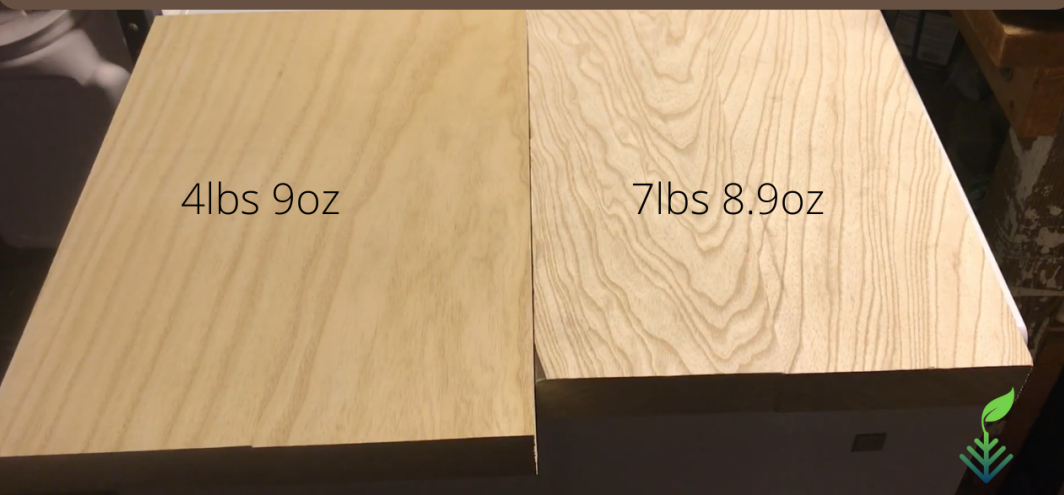


# MEGAFLORA TREE PRODUCTS

## Paulownia Wood For Lightweight Composite Applications - Made In USA



### Paulownia Wood V.S. Swamp Ash



MegaFlora wood is a light, strong hardwood that is also considered the “aluminum of lumbers”.

Paulownias' fast growth rate, carbon sequestration and soil enhancing properties make it an ideal eco-timber, very appealing to green consumers who desire environmentally friendly alternatives.

Wood density is low, making it one of the lightest timbers available on the market.

The commercial importance of this wood is high due to its strength to weight ratio, high insulation R-value properties, resistance moisture and to warping.

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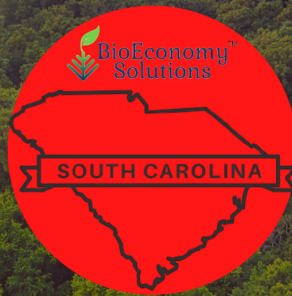




# MEGAFLORA VENEER PRODUCTS

## PAULOWNIA VENEER SALE!

SOUTH CAROLINA-USA WOOD MILL



## PAULOWNIA VENEER

Paulownia wood veneer is used in a variety of products. Direct from our South Carolina - USA veneer plant.

### Our Standard Sheet Size

4ft Wide X 8ft Long:

#### 1/6" (Nominal)

CUT: 4.1 mm x 2515mm WIDE x 1270mm LONG

INV: 4.1 mm x 2440mm WIDE x 1220mm LONG-

#### 1/10" (Nominal)

CUT: 4.1 mm x 2515mm WIDE x 1270mm LONG

INV: 4.1 mm x 2440mm WIDE x 1220mm LONG






# **VENEER WOOD**

MegaFlora wood is used in the production of musical instruments, furniture, windows, doors, venetian blinds and crown moldings.

It can be peeled as a veneer to a 1/32 of an inch in thickness.

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**MegaFlora wood can be peeled for veneer to a 1/32 of an inch in thickness**

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### Veneer Thickness Comparison Chart

Piece of paper ( $\frac{1}{250}$ " or 0.004" or 0.1 mm)
$\frac{1}{42}"$ (0.024", 0.6 mm)
$\frac{1}{32}"$ (0.031", 0.8 mm)
$\frac{1}{24}"$ (0.042", 1 mm)
$\frac{1}{16}"$ (0.063", 1.5 mm)
$\frac{1}{8}"$ (0.13", 3 mm)
$\frac{1}{6}"$ (0.17", 4 mm)

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## Veneers

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**2021 | JAN**

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